

**MIFluFocus**  
**July 6, 2006**  
**Weekly Influenza Surveillance and Avian Influenza Update**

**Michigan Disease Surveillance System:** Flu-like illness activity, as reported in MDSS, has continued to decrease over the past week to a lower level than was reported from the same period in 2005.

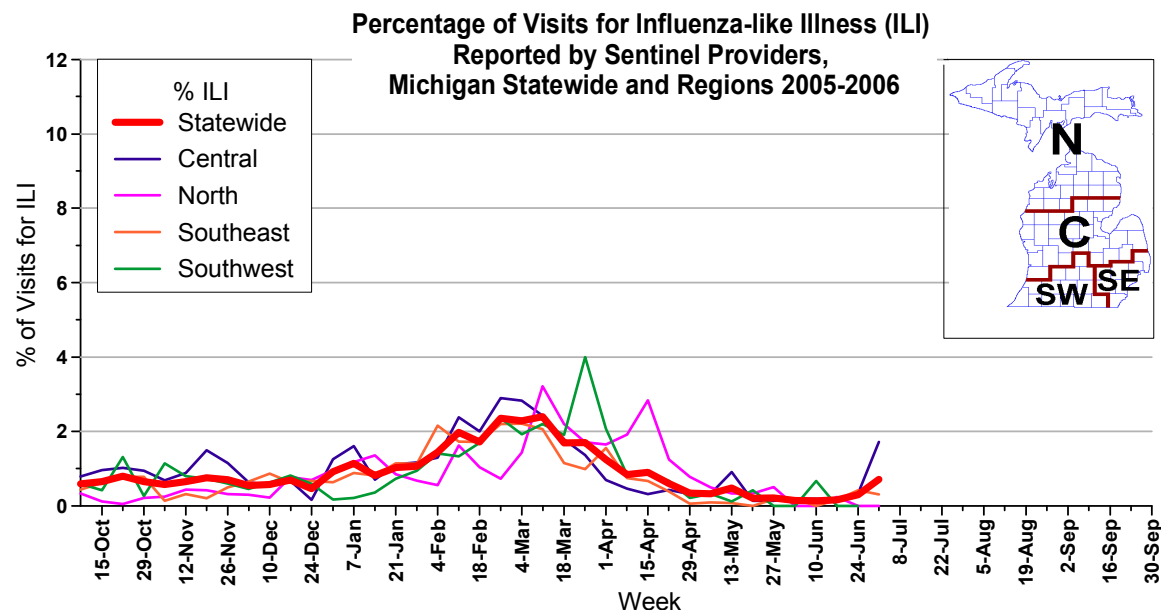
**Emergency Department Surveillance:** Emergency department visits due to constitutional and respiratory complaints continued to show decreasing activity since last week. The current level of both indicators is lower than those reported from the same period last year. Over the past week, no statewide alerts were generated for either indicator.

**Over-the-Counter Product Surveillance:** The past week has demonstrated no overall increase in flu-like illness activity. With the exception of anti-fever product sales, which has shown a slight increase in trend, all recent product sales have either decreased or remained stable. Chest rub and thermometer sales continue to remain at higher levels than those reported from the same period last year; sales of all other indicators is comparable to or decreased from last year.

**Sentinel Surveillance (as of July 6, 2006):** During the week ending July 1, 2006, the proportion of visits due to influenza-like illness (ILI) increased from last week to 0.7% of all visits. The levels of ILI activity varied significantly across the state; the percentage of visits due to ILI by region was 1.7%, Central; 0.0%, North; and 0.3%, Southeast. No sentinel reports were available for the Southwest region for the week ending July 1, 2006 as of this writing.

The increased rate of ILI for the past week is being driven by a single large pediatric practice in the Central region that saw five of the eight total reported visits due to ILI. We have requested that clinical specimens from future cases be collected and sent to the MDCH laboratory for respiratory virus culture.

These data should be interpreted with caution due to low a level of reporting following the July 4<sup>th</sup> holiday. The most recent week's data are subject to change as late reports arrive.



As part of pandemic influenza preparedness, CDC and MDCH highly encourage and recommend year-round participation from all sentinel providers. Data that we obtain over the summer will help us to establish a baseline level of activity during months that are not typically associated with high levels of

influenza activity. New practices are encouraged to join influenza sentinel surveillance program today! Contact Rachel Potter at 517-335-9710 or [potterr1@michigan.gov](mailto:potterr1@michigan.gov) for more information.

**Laboratory Surveillance (as of July 6, 2006):** No reports were received during the previous week. The MDCH laboratory has confirmed 138 influenza cases in Michigan over the 2005-2006 season, of which 132 were influenza A (H3N2) and 6 were influenza B.

**Influenza-Associated Pediatric Mortality (as of July 6, 2006, CDC data as of May 20):** No reports were received during the previous week. For the 2005-2006 influenza season, Michigan had one confirmed influenza-associated pediatric death from region 2S, with one other death under investigation at this time by MDCH. During October 2, 2005 – May 20, 2006, CDC received reports of 35 influenza-associated pediatric deaths, 33 of which occurred during the current influenza season.

\*\*\*Reminder: The CDC has asked all states to continue to collect information on any pediatric death associated with influenza infection. This includes not only death in a child less than 18 years of age resulting from a clinically compatible illness confirmed to be influenza by an appropriate laboratory or rapid diagnostic test, but also unexplained death with evidence of an infectious process in a child. Refer to [http://www.michigan.gov/documents/fluletter\\_107562\\_7.pdf](http://www.michigan.gov/documents/fluletter_107562_7.pdf) for the complete protocol. It is important to immediately call or fax information to MDCH to ensure that appropriate clinical specimens can be obtained.

**Congregate Settings Outbreaks (as of June 29, 2006):** No reports were received during the past reporting week. A total of two congregate setting outbreaks have been reported to MDCH this season; one in Southwest Michigan in late February and one in Southeast Michigan in late March. Both outbreaks were MDCH laboratory confirmed as due to influenza A (H3N2).

**The 2005-2006 Michigan Influenza Seasonal Summary is now available at <http://www.michigan.gov/flu> under “Seasonal Influenza – MDCH Laboratory Influenza Testing and Surveillance.”** Overall, this season was milder than the previous year, peaked in early to mid-March and was comprised mainly of influenza A infections.

**National (June 29, 2006):** On June 28, 2006, the Advisory Committee on Immunization Practices (ACIP) published its new recommendations for the prevention and control of influenza. For the complete report, see the MMWR report June 28, 2006/55(Early Release);1-41, available at <http://www.cdc.gov/mmwr/preview/mmwrhtml/rr55e628a1.htm>.

Principal changes include:

- 1) Recommending vaccination of children aged 24--59 months and their household contacts and out-of-home caregivers against influenza.
- 2) Highlighting the importance of administering 2 doses of influenza vaccine for children aged 6 months--<9 years who were previously unvaccinated.
- 3) Advising health-care providers, those planning organized campaigns, and state and local public health agencies to a) develop plans for expanding outreach and infrastructure to vaccinate more persons than the previous year and b) develop contingency plans for the timing and prioritization of administering influenza vaccine, if the supply of vaccine is delayed and/or reduced.
- 4) Reminding providers that they should routinely offer influenza vaccine to patients throughout the influenza season.
- 5) Recommending that neither amantadine nor rimantadine be used for the treatment or chemoprophylaxis of influenza A in the United States until evidence of susceptibility to these antiviral medications has been re-established among circulating influenza A viruses.
- 6) Using the 2006--07 trivalent influenza vaccine virus strains: A/New Caledonia/20/1999 (H1N1)-like, A/Wisconsin/67/2005 (H3N2)-like, and B/Malaysia/2506/2004-like antigens. For the A/Wisconsin/67/2005 (H3N2)-like antigen, manufacturers may use the antigenically equivalent A/Hiroshima/52/2005 virus; for

the B/Malaysia/2506/2004-like antigen, manufacturers may use the antigenically equivalent B/Ohio/1/2005 virus.

**International (CDC, as of June 16):** According to the CDC, for the 2005-2006 season worldwide, influenza B viruses were the most commonly reported influenza type in Europe, influenza A (H1N1) and influenza B viruses predominated in Asia, and small numbers of influenza A and B viruses were reported in Africa.

\*\*\*\*\*  
Weekly influenza activity reporting to the CDC is finished for the 2005-2006 influenza season.

### **End of Seasonal Report**

\*\*\*\*\*

## **Avian Influenza Activity**

**WHO Pandemic Phase:** Phase 3 - Human infection(s) with a new subtype, but no human-to-human spread or rare instances of spread to a close contact.

**International Update (WHO, as of July 4, and Canadian Food Inspection Agency, as of July 5):** The Ministry of Health in Indonesia has confirmed the country's 52<sup>nd</sup> case of human infection with the H5N1 avian influenza virus. The case, which was fatal, occurred in a 5-year-old boy from Tulungagung district, East Java Province. The boy became ill on June 8<sup>th</sup>, was hospitalized on June 14<sup>th</sup> and died two days later on June 16<sup>th</sup>. An investigation found a history of chicken deaths in the boy's household two weeks before symptom onset. Laboratory testing of poultry in the sub-district confirmed the presence of H5N1 in chickens. Monitoring of close contacts has detected no further cases. Of the 52 cases confirmed to date in Indonesia, 40 (77%) have been fatal.

Testing by Canada's avian influenza (AI) reference laboratory in Winnipeg of birds from a small backyard flock in western Prince Edward Island has been completed with no evidence of H5 avian influenza virus found in the birds. Disease control measures had been implemented on and around the premises which was home to the flock on June 16, 2006 after preliminary testing of samples from one gosling found evidence of an H5 virus. Samples from the flock were sent to the Winnipeg lab for confirmatory testing. All birds tested negative on serological and virological tests. Attempts to grow virus from samples from the gosling found no further evidence of virus. The testing is now complete. A quarantine which was placed on the premises on June 16 was formally released on July 5.

A summary of H5N1 human cases from December 1, 2003 to April 30, 2006 is presented in a study titled "Epidemiology of WHO-confirmed human cases of avian influenza A(H5N1) infection", published in the WHO Weekly Epidemiological Record. The study examines the number and incidence of cases, demographic characteristics, the time from symptom onset until hospitalization, and mortality. For the full article, please reference "Epidemiology of WHO-confirmed human cases of avian influenza A(H5N1) infection" Weekly Epidemiological Record 81(26) June 30, 2006: 249-260 or go to the website <http://www.who.int/wer/wer8126.pdf>.

**National Update (June 29, 2006):** The Department of Health and Human Services released an update: "Pandemic Planning Update II." Access the report at [www.pandemicflu.gov/plan/pdf/PanfluReport2.pdf](http://www.pandemicflu.gov/plan/pdf/PanfluReport2.pdf).

**National Wild Bird Surveillance (June 29, 2006):** The weekly report from the U.S. Fish and Wildlife Service (USFWS) stated that 339 subsistence-collected cloacal samples were shipped to the USGS National Wildlife Health Center (NWHC) from the Alaska Science Center this week. All shipped samples were collected by USFWS through the subsistence sampling scenario. Samples were from the village of Hooper Bay on the Yukon Kuskokwim Delta and from the village of Gamble on St Lawrence Island. An additional 177 cloacal samples from live bird sampling of long billed dowitchers and pectoral sandpipers from the YK delta were shipped to the USGS NWHC from the Alaska Science Center this week.

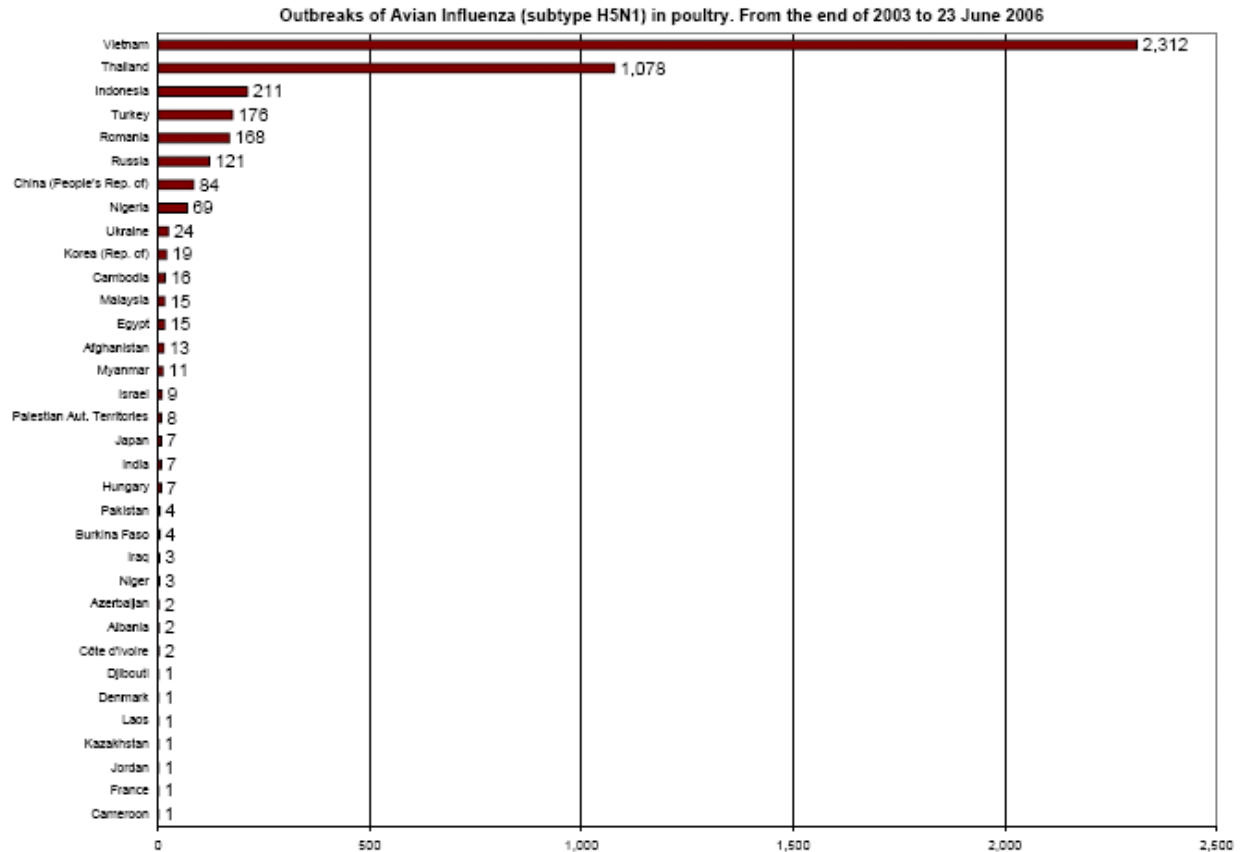
To date, a total of 3,626 cloacal samples collected by the USFWS have been sent to the NWHC. Analyses of these samples have resulted in 62 samples that tested matrix gene RT-PCR positive. This indicates the presence of avian influenza in these samples. Further characterization of the 62 matrix positive samples indicated presumptive H5 subtype of the hemagglutinin protein in three samples. These samples were shipped to the NVSL lab to undergo further diagnostics. One of the three H5 presumptive positives was confirmed by NVSL and was further characterized as an H5N2 subtype.

Alaska USFWS currently has 16 projects in the field collecting samples from live birds. July is anticipated to be the busiest sampling time, with 28 projects in the field at peak sampling.

**Michigan Wild Bird Surveillance:** To learn about avian influenza surveillance in Michigan wild birds or to report dead waterfowl, go to Michigan's Emerging Disease website at <http://www.michigan.gov/emergingdiseases>

**Table 1. H5N1 Influenza in Poultry (Outbreaks up to June 23, 2006)**

(Source: [http://www.oie.int/download/AVIAN%20INFLUENZA/A\\_AI-Asia.htm](http://www.oie.int/download/AVIAN%20INFLUENZA/A_AI-Asia.htm) Downloaded 6/29/2006)



**Table 2. H5N1 Influenza in Humans (Cases up to July 4, 2006)**

(Source: [http://www.who.int/entity/csr/disease/avian\\_influenza/country/cases\\_table\\_2006\\_06\\_06/en/index.html](http://www.who.int/entity/csr/disease/avian_influenza/country/cases_table_2006_06_06/en/index.html) Downloaded 7/5/2006)

Cumulative number of confirmed human cases of Avian Influenza A(H5N1) reported to WHO. The total number of cases includes number of deaths. WHO only reports laboratory-confirmed cases.

Country	2003		2004		2005		2006		Total	
	cases	deaths	cases	deaths	cases	deaths	cases	deaths	cases	deaths
Azerbaijan	0	0	0	0	0	0	8	5	8	5
Cambodia	0	0	0	0	4	4	2	2	6	6
China	0	0	0	0	8	5	11	7	19	12
Djibouti	0	0	0	0	0	0	1	0	1	0
Egypt	0	0	0	0	0	0	14	6	14	6
Indonesia	0	0	0	0	17	11	35	29	52	40
Iraq	0	0	0	0	0	0	2	2	2	2
Thailand	0	0	17	12	5	2	0	0	22	14
Turkey	0	0	0	0	0	0	12	4	12	4
Viet Nam	3	3	29	20	61	19	0	0	93	42
Total	3	3	46	32	95	41	85	55	229	131